ABSTRACT OF THE DISCLOSURE

Methods are disclosed for sterilizing biological materials to reduce the level therein of one or more active biological contaminants or pathogens, such as viruses, bacteria (including inter- and intracellular bacteria, such as mycoplasmas, ureaplasmas, nanobacteria, chlamydia, rickettsias), yeasts, molds, fungi, prions or similar agents responsible, alone or in combination, for TSEs and/or single or multicellular parasites. These methods involve the use of flavonoid/flavonol stabilizers in sterilizing biological materials with irradiation.